## Response of Wisconsin Power and Light Company to

## The Public Service Commission of Wisconsin Data Request No. 3.06

Docket Number: 05-CE-137
Date of Request: March 11, 2009
Information Requested By: Ken Detmer
Date Responded: March 30, 2009
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Witness: (If other than Author)

## Data Request No. 3.06:

Follow-up to Question 1.12: As an alternative to meeting Phase II RACT requirements, can Unit 3 be retired to allow higher NOx output from Unit 4 and 5? Must the average heat input for Edgewater 3 be changed to 0 in the calculations if any unit is retired?

## Response:

NOx emissions rates at Unit 4, Unit 5, or both must be reduced to meet the Phase II RACT requirements regardless of whether or not Unit 3 is retired. Complying with RACT requires the facility to achieve a facility average NOx emissions rate (in lb per MMBTU) that is equal to or less than a calculated emissions rate limit. Although Unit 3 has a higher NOx emissions rate than Units 4 or 5, it only makes up roughly 10% of the total fuel burned (in MMBTU) at the facility. Because of its relatively small size, Unit 3 is not a major driver in the facility average NOx emissions rate.

If Unit 3 were to be retired, the compliance margins for Scenarios 1 through 3 in Table 4 change as follows:

Compliance Margin Summary (with WEPCO share of Edgewater 5 included)

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Scenario	Without Unit 3 Retired	With Unit 3 Retired
1	-36.6%	-37.1%
2	10.5%	17.1%
3	-16.8%	-14.3%

Compliance Margin Summary (without WEPCO share of Edgewater 5 included)

Scenario	Without Unit 3 Retired	With Unit 3 Retired
1	-34.4%	-33.6%
2	5.9%	13.6%
3	-11.8%	-7.1%

If Unit 3 was retired, the compliance margins in Scenario 2 (SCR installed on Unit 5) would increase, however, such a retirement would not sufficiently change the compliance margins in Scenario 1 (no SCR installed on Unit 4 or Unit 5) or Scenario 3 (SCR installed on Unit 4). Those scenarios would not be sufficient to meet Phase II RACT requirements.

The historical average heat inputs for Edgewater 3 must be changed to 0 in the calculations in the spreadsheet (see responses to DR 1.12 and 1.27) to analyze the impact to the compliance margin from retirement of Edgewater 3.